UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/672,771	09/26/2003	Shaobo Wang	2003P04918US01	9712

7590   06/01/2007

Siemens Corporation
Intellectual Property Department
170 Wood Avenue South
Iselin, NJ 08830

EXAMINER
WONG, BLANCHE

ART UNIT	PAPER NUMBER
2616	

MAIL DATE	DELIVERY MODE
06/01/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)
Office Action Summary	10/672,771	WANG ET AL.
	Examiner	Art Unit	
	Blanche Wong	2616	

-- *The MAILING DATE of this communication appears on the cover sheet with the correspondence address* --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) ☒ Responsive to communication(s) filed on <u>26 September 2003</u>.

2a) ☐ This action is **FINAL**.   2b) ☒ This action is non-final.

3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) ☒ Claim(s) <u>1-16</u> is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5) ☐ Claim(s) _____ is/are allowed.

6) ☒ Claim(s) <u>1-16</u> is/are rejected.

7) ☐ Claim(s) _____ is/are objected to.

8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) ☐ The specification is objected to by the Examiner.

10) ☒ The drawing(s) filed on <u>26 September 2003</u> is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a) ☐ All   b) ☐ Some * c) ☐ None of:

      1. ☐ Certified copies of the priority documents have been received.

      2. ☐ Certified copies of the priority documents have been received in Application No. _____.

      3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)

2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
    Paper No(s)/Mail Date <u>Mar05</u>.

4) ☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____.

5) ☐ Notice of Informal Patent Application

6) ☐ Other: _____.

DETAILED ACTION

Drawings

1.   The drawings are objected to under 37 CFR 1.83(a). The drawings must show

every feature of the invention specified in the claims. Therefore, the content-provider

data processing system (claims 1 and 10) and connection-management application

(claim 10) must be shown or the feature(s) canceled from the claim(s). No new matter

should be entered.

Appropriate correction is required.

Claim Rejections - 35 USC § 102

2.   The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that

form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (e) the invention was described in (1) an application for patent, published under section 122(b), by
> another filed in the United States before the invention by the applicant for patent or (2) a patent
> granted on an application for patent by another filed in the United States before the invention by the
> applicant for patent, except that an international application filed under the treaty defined in section
> 351(a) shall have the effects for purposes of this subsection of an application filed in the United States
> only if the international application designated the United States and was published under Article 21(2)
> of such treaty in the English language.

3.   **Claims 10-16** are rejected under 35 U.S.C. 102(e) as being anticipated by Allan

et al. (U.S. Pat No. 6,788,696).

With regard to claim 10, Allan discloses an ATM communication system

comprising:

a subscriber data-processing system **(CPE 22 in Fig. 2)** for providing a

subscriber with access to said communication system **(Fig. 2)**;

a digital subscriber line (DSL) modem for modulating and demodulating data

from transmission over a local loop telephone line to a DSL multiplexer (DSLAM)

(access module 12 in Fig. 2; see also DSLAM, col. 1, line 51);

an asynchronous transfer mode (ATM) edge device **(ATM edge switch, col. 7,**

lines 3-4) in communication with said DSLAM for receiving data from and transmitting

data over an ATM network **(ATM network 18 in Fig. 2)**;

a proxy signaling server **(Service Gateway 14 in Fig. 2, col. 6, line 45)** in

communication with said subscriber data processing system;

a content-provider data processing system **(content provider 16 in Fig. 2)** in

communication with said ATM network for providing broadband content to a subscriber;

a client-side application **(browser, col. 6, line 39)** on said subscriber data

processing for use by said subscriber to request **(requested using CPEs 22, col. 6,**

line 36) a bandwidth-on-demand session **(requests for content such as streaming**

video, Web TV, staggercast data, or any other content that requires QoS for

subscriber satisfaction, col. 6, lines 33-34) and for transmitting information

(requested content) to said proxy signaling server in response to said request; and

a connection-management application **(policy and billing verification)** on said

proxy signaling server **(Service Gateway performs policy and billing verification,**

col. 6, line 59) for receiving said information and for signaling to said ATM edge device

(ATM edge switch, col. 7, lines 3-4) on behalf of said CPE to establish one or more

SVCs from said CPE to said content-provider data processing system.

With regard to claim 11, Allan further discloses DSLAM is supports bridge mode

(each CPE is normally connected to the ATM access network via an access

module, col. 1, lines 49-50).

With regard to claim 12, Allan further discloses UNI signals **(UNI signaling, col.**

7, line 3).

With regard to claim 13, Allan further discloses web-browser plug-in **(browser,**

col. 6, line 39).

With regard to claim 14, Allan further discloses a dialer application **(pre-request**

dialog, col. 6, line 41).

With regard to claim 15, Allan further discloses an ATM switch **(ATM edge**

switch, col. 7, lines 3-4).

With regard to claim 16, Allan discloses an ATM communications system

comprising:

a subscriber data-processing system **(CPE 22 in Fig. 2)** for use by a subscriber

to transmit and receive data to and from a remote content-provider data processing

system **(content provider 16 in Fig. 2)**;

client premise equipment (CPE) **(CPE 22 in Fig. 2)** in communication with said

subscriber data processing system for transmitting and receiving said data over a local

loop to a DSL multiplexer (DSLAM) **(access module 12 in Fig. 2; see also DSLAM,

col. 1, line 51)**;

an asynchronous transfer mode (ATM) edge device **(ATM edge switch, col. 7,

lines 3-4)** in communication with said DSLAM for receiving data from and transmitting

data over an ATM network **(ATM network 18 in Fig. 2)**;

a proxy signaling server **(Service Gateway 14 in Fig. 2, col. 6, line 45)** in

communication with said subscriber data processing system and said ATM edge device;

means **(the subscriber may have a browser, col. 6, line 39)** in said subscriber

data processing system, responsive to said subscriber, for sending a request to said

proxy signaling server to initiate a bandwidth-on-demand session; and

means **(the access module 12, which is a VC-merge enabled node, ... the

new connection ... [from the edge switch of the content provider] to the CPE, col.

7, lines 27-30)** in said proxy signaling server, responsive to said request, for initiating

said bandwidth-on-demand session by creating one or more SVCs between said

subscriber data processing system and said content-provider data processing system.

Claim Rejections - 35 USC § 103

4.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set
> forth in section 102 of this title, if the differences between the subject matter sought to be patented and
> the prior art are such that the subject matter as a whole would have been obvious at the time the
> invention was made to a person having ordinary skill in the art to which said subject matter pertains.
> Patentability shall not be negatived by the manner in which the invention was made.

5.   **Claims 1-9** are rejected under 35 U.S.C. 103(a) as being unpatentable over

Kalimuthu et al. (U.S. Pat No. 7,154,852) in view of Sreedharan et al. (Pub No.

US2002/0057700) and Allan.

With regard to claim 1, Kalimuthu discloses dynamic allocation for ATM

connections

initiating a bandwidth-on-demand session **(rate of demand) (see also**

"bandwidth is dynamically adjusted according to demand", col. 1, lines 65-66) by

creating one or more SVCs **(additional switched virtual circuits)** to supplement

(additional ... increase in the rate) the bandwidth **(adding bandwidth)** of said default

connection **("open additional switched virtual circuits for adding bandwidth, if**

there is an increase in the rate of demand", col. 1, lines 60-62); and

ending said bandwidth-on-demand session by terminating **(closed)** said one or

more SVCs **(additional switched virtual circuits) (if demand decreases, some of**

the additional switched virtual circuits may be closed, col. 1, lines 62-64).

However, Kalimuthu fails to explicitly show establishing a default connection between a

subscriber data processing system and a content-provider data processing system, said

default connection comprising an ATM PVC.

Sreedharan discloses ATM networking.establishing a default connection **(initially**

established), said default connection comprising an ATM PVC **("a tunneling PVC**

connection is initially established by network management device", para. [0034]).

Allan discloses and ATM network connecting between a subscriber data

processing system **(CPE 22 and access module 12 in Fig. 2)** and a content-provider

data processing system **(content provider 16 in Fig. 2)**.

At the time of the invention, it would have been obvious to a person of ordinary

skills in the art to combine a default connection as taught in Sreedharan and connection

between a subscriber data processing system and a content-provider data processing

system as taught in Allan with Kalimuthu's ATM system in order to reliably connect

between a subscriber and a content-provider.

With regard to claim 2, the combination of Kalimuthu, Sreedharan and Allan

discloses the method of claim 1.

Allan further discloses sending a message from said subscriber data processing

system **(requested using CPEs 22, col. 6, line 36)** to a proxy signaling server

(Service Gateway 14 in Fig. 2, col. 6, line 45) comprising information **(requested**

content) related to said bandwidth-on-demand session **(requests for content such as**

streaming video, Web TV, staggercast data, or any other content that requires

QoS for subscriber satisfaction, col. 6, lines 33-34) and, in response to said

message, sending a message from said proxy signaling server **(Service Gateway)** to

an ATM edge device **(ATM edge switch) (Service Gateway sends a proxy message**

to an ATM edge switch, col. 7, lines 3-4) (see also ATM edge switch 19 in Fig. 2) to

create one or more SVCs **(new connection)** between said subscriber data processing

system **(CPE)** and said content-provider data processing system **(content provider)**

(the access module 12, which is a VC-merge enabled node, ... the new connection

... [from the edge switch of the content provider] to the CPE, col. 7, lines 27-30).

At the time of the invention, it would have been obvious to a person of ordinary

skills in the art to combine sending a message from said subscriber data processing

system to a proxy signaling server comprising information related to said bandwidth-on-

demand session and, in response to said message, sending a message from said proxy

signaling server to an ATM edge device to create one or more SVCs between said

subscriber data processing system and said content-provider data processing system

as taught in Allan with Kalimuthu and Sreedharan in order to reliably connect between a

subscriber and a content-provider.

With regard to claim 3, the combination of Kalimuthu, Sreedharan and Allan

discloses the method of claim 1.

Allan further discloses authenticating **(Service Gateway performs policy and**

billing verification, col. 6, line 59) (before billing and delivering services

accordingly, it is obvious that the subscribers are authenticated) said subscriber

(CPE's address) (the proxy message includes CPE's address, col. 7, line 16).

At the time of the invention, it would have been obvious to a person of ordinary

skills in the art to combine authenticating said subscriber as taught in Allan with

Kalimuthu and Sreedharan in order to reliably connect between a subscriber and a

content-provider.

With regard to claim 4, the combination of Kalimuthu, Sreedharan and Allan

discloses the method of claim 1.

Allan further discloses UNI signals **(UNI signaling, col. 7, line 3).**

At the time of the invention, it would have been obvious to a person of ordinary

skills in the art to combine UNI as taught in Allan with Kalimuthu and Sreedharan in

order to reliably connect between a subscriber and a content-provider.

With regard to claim 5, the combination of Kalimuthu, Sreedharan and Allan

discloses the method of claim 1.

Allan further discloses sending a message from said subscriber data processing

system to a proxy signaling server comprising information related to said bandwidth-on-

demand session and, in response to said message, sending a message from said proxy

signaling server to an ATM edge device to create one or more SVCs between said

subscriber data processing system and said content-provider data processing system **(It**

is obvious that the connection is established with QoS necessary to meet the

CPE's request and to deliver content such as streaming video, Web TV, staggercast data, or any other content that requires QoS for subscriber satisfaction, Allan, col. 6, lines 33-34. After delivery, the QoS demand is no longer there. If demand decreases, some of the additional switched virtual circuits may be closed, Kalimuthu, col. 1, lines 62-64.).

At the time of the invention, it would have been obvious to a person of ordinary skills in the art to combine sending a message from said subscriber data processing system to a proxy signaling server comprising information related to said bandwidth-on-demand session and, in response to said message, sending a message from said proxy signaling server to an ATM edge device to create one or more SVCs between said subscriber data processing system and said content-provider data processing system as taught in Allan and Kalimuthu with Sreedharan in order to reliably connect between a subscriber and a content-provider.

With regard to claim 6, the combination of Kalimuthu, Sreedharan and Allan discloses the method of claim 1.

Allan further discloses an ATM switch **(ATM edge switch, col. 7, lines 3-4)**.

At the time of the invention, it would have been obvious to a person of ordinary skills in the art to combine an ATM switch as taught in Allan with Kalimuthu and Sreedharan in order to reliably connect between a subscriber and a content-provider.

With regard to claim 7, the combination of Kalimuthu, Sreedharan and Allan discloses the method of claim 1.

Allan further discloses a client-side application **(browser, col. 6, line 39)**.

At the time of the invention, it would have been obvious to a person of ordinary skills in the art to combine a client-side application as taught in Allan with Kalimuthu and Sreedharan in order to reliably connect between a subscriber and a content-provider.

With regard to claim 8, the combination of Kalimuthu, Sreedharan and Allan discloses the method of claim 1.

Allan further discloses web-browser plug-in **(browser, col. 6, line 39)**.

At the time of the invention, it would have been obvious to a person of ordinary skills in the art to combine a web-browser plug-in as taught in Allan with Kalimuthu and Sreedharan in order to reliably connect between a subscriber and a content-provider.

With regard to claim 9, the combination of Kalimuthu, Sreedharan and Allan discloses the method of claim 1.

Allan further discloses a dialer application **(pre-request dialog, col. 6, line 41)**.

At the time of the invention, it would have been obvious to a person of ordinary skills in the art to combine a dialer application as taught in Allan with Kalimuthu and Sreedharan in order to reliably connect between a subscriber and a content-provider.

Conclusion

6.   Any inquiry concerning this communication or earlier communications from the examiner should be directed to Blanche Wong whose telephone number is 571-272-3177. The examiner can normally be reached on Monday through Friday, 830am to 530pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Huy Vu can be reached on 571-272-3155. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

ßw

BW
May 26, 2007

HUY D. VU
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600